

Entomology – The Collection



District & State 4-H O-Rama
Junior & Senior 4-H'ers



The entomology collection activity is held so that 4-H members can become better acquainted with the insect world in which they live. Collecting and learning numerous insects by name will aid in understanding insects and the problems they can cause for man.

OBJECTIVES

Targeted Life Skills: Self-responsibility, decision-making



Opportunity will be provided for faculty to share information about related college degree programs in pest management and career options such as crop consultant, lab research technician, pest controller, agricultural industry and regulatory positions, nurseries, home and garden centers, and Cooperative Extension Service.

- *To learn to identify areas where insects can be found
- *To learn to identify characteristics that make an insect an insect
- *To learn to organize the insects into their different orders by use of insect identification books
- *To realize that a career in entomology can be rewarding

ELIGIBILITY

District 4-H O-Rama: Each county may enter two junior (9-13) and two senior (14-19) members at the District 4-H O-Rama.

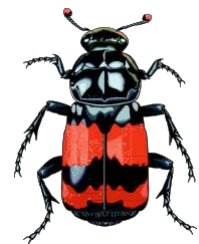
Arkansas 4-H O-Rama: The Top 7 senior members from the district contests will be eligible to compete at the state contest.

ACTIVITY

Entomology activity at District and State 4-H O-Rama's consists of two parts:

- (1) a collection exhibit (100 points) and
- (2) insect identification quiz (20 points).

Collections should be made by the 4-H member and collected and mounted as suggested in publications MP 83, "Making an Insect Collection," or pages 16-17 in the for-sale publication BU-6854, "What's Bugging You?" (Entomology 2).



COLLECTION EXHIBIT

Junior members' collection minimum requirements:

- Must contain a minimum of 15 adult insects from a minimum of 5 orders
- Insect should be pinned using insect pins
- Collection can be entered in cigar box or other suitable display box but standard display boxes are preferred.

Senior members' collection minimum requirements:

- Must contain a minimum of 25 adult insects from a minimum of 9 orders
- Insects should be pinned using insect pins
- Collections are to be entered in the standard display box as shown in MP 83, Making an Insect Collection.

Entomology Insect Collection participants in the 4-H District and State O-Rama Completions must have their collections checked by their County 4-H Agent or County Staff Chair as to whether they meet the minimum requirements stated above. Competitors with collections not meeting the minimum requirements and entered in District or State O-Rama Competitions will not be disqualified but will receive a participation ribbon only.

INSECT IDENTIFICATION TEST

Junior and Senior members identify 10 insect specimens as to order and common name. The insects to be identified will be common insects native to Arkansas.

AWARDS

District 4-H O-Rama: One trophy will go to the Senior winner and one trophy to the Junior winner. For Senior 4-H members, the collection used for district judging can be changed and added to between the district and state activity. Ribbons will be awarded to first-, second-, third-, fourth- and fifth-place winners in both Junior and Senior divisions at each district activity.

Arkansas 4-H O-Rama: One trophy will be awarded the Senior winner at the state activity, along with ribbons for the second- through fifth-place winners.

JUDGING

Collections will be judged using a scoring system based on insects collected, specimen quality, pinning technique, labeling, identification and general appearance of the collection. Follow the suggestions for making a good collection to rate a high score. Members may use their own systems for arrangement of specimens to improve the appearance and attractiveness of the collections. The collections will count 100 points. Very important to a collection is the number of different orders, as well as a variety of different insects.

Credit will be given for each correct answer in the identification part of the activity for a total of 20 points. A total of 120 points may be earned on the combination of the collection and the identification parts of the activity.

SCORECARD AND SUGGESTIONS FOR MAKING A GOOD COLLECTION

A useful collection consists of many different species of insects, neatly mounted, labeled and arranged in good display boxes. Uniformity of labeling, mounting and arranging is of utmost importance in making an attractive collection. Insect collections will be judged according to the following scorecard:

ENTOMOLOGY SCORECARD

- | | | |
|----|---------------------------------------|-----------|
| 1. | Different orders correctly identified | 25 points |
| 2. | Pinning and spreading technique | 25 points |
| | a. Proper wing spreading | |

- b. Pins inserted properly
 - c. Uniform height on pins
 - d. Insects level and straight
 - e. Condition of specimens
3. Identification and labeling 25 points
- a. Labels neat and accurate
 - b. Labels uniform height on pins
 - c. Labels not twisted on pins
 - d. Insects assigned correct order
 - e. Accuracy of common names
4. General appearance of collection 25 points
- a. Variety of insects
 - b. No species duplication
 - c. Grouping and spacing
 - d. Arrangement and background
 - e. Educational features added

SUGGESTIONS FOR MAKING A GOOD COLLECTION

1. Use undamaged specimens
2. Spread the wings of Lepidoptera
3. Place all insects the same height on the pins
4. Use only regular insect pins
5. Use uniform labels placed the same height on pins and kept straight
6. Group each order in columns under the order label and arrange the specimens in neat straight rows
7. Varnished and waxed display cases are more attractive
8. Use white or light color background in the bottom of the box to show specimens to best advantage
9. Use educational features

REFERENCES

For sale 4-H publications: Entomology 1, 2, 3 and Helpers Guide

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Note: Work done in the district and state entomology activity should be reported in 4-H record books under *Entomology* activity. If no entomology project is being taken, report entomology activity work under other related projects such as agriculture, beef cattle, field crops, home management, safety, etc., where insect control is a part of carrying out these projects.

